

#OrbitOhio



3RD ANNUAL OHIO SPACE FORUM

"Ohio is Leading Space Industrialization by Enabling Life and Operations in Space"

May 17-18, 2022

NASA Glenn Research Center | Cleveland, OH

WELCOME



Thank you for attending the Ohio Space Forum, and participating in Ohio's reach for the stars! In a short span of time, this "Orbit Ohio" Forum has grown into a major event with national impact. As the name suggests, we come together as a community to learn more about how our federal installations, our industries, and our communities can help shape and support Ohio's impact on Space.

Our theme this year is the "Industrialization of Space by enabling Life and Operations in Space". This represents a powerful opportunity to gather among nationally recognized thought leaders in space intelligence, exploration, and defense to benefit from their expertise. We seek to promote an exchange of ideas with state and national leaders to learn how Ohio can continue to build on our unparalleled space heritage, innovation, and tech workforce as we pave the way in fortifying America's National and Economic Security and Space Exploration objectives.

As always, our framework will focus on Governor DeWine's four Ohio Defense and Aerospace Pillars: Installations, Research & Development, Industry and Workforce. Your insights and active participation in these areas help highlight Ohio's impact on our commercial, civil and military space programs, and the economic importance of the Aerospace and Defense fabric of Ohio. Governor DeWine's continued support of our Defense and Aerospace community allows Ohio to be a cornerstone of this nation's capabilities. I look forward to discussing with each of you how Ohio can work together with One Voice to strengthen its impact on our national space efforts! Thanks to NASA Glenn and JobsOhio for making this event possible! Additionally, I would like to thank all the panelists and participants for coming together to reaffirm our commitment to Ohio's Space community and industry.

Sincerely,

Joseph E. Zeis, Jr.

Aerospace and Defense Advisor, Office of Governor Mike DeWine

AGENDA

Day 1 - Tuesday, May 17

1:00 - 4:00 PM

NASA GLENN FACILITY TOURS

Day 2 - Wednesday, May 18

7:00 - 8:00 AM

CHECK IN AND CONTINENTAL BREAKFAST

8:00 - 8:45 AM

NATIONAL ANTHEM

WELCOME MESSAGE

ORBIT OHIO WELCOME

Ms. Elaine Bryant, Executive Vice President for Aerospace and Defense, Dayton Development Coalition (DDC) and Managing Director for Military and Federal Sector, JobsOhio

JOBSONIO OPENING REMARKS AND GOVERNOR'S INTRODUCTION

Mr. Terrance Slaybaugh, Vice President, Sites and Infrastructure, JobsOhio

GOVERNOR'S WELCOME VIDEO MESSAGE

Governor Mike DeWine, Governor of the State of Ohio

MAYORAL WELCOME VIDEO MESSAGE

Mayor Justin Bibb, Mayor of Cleveland

FEDERAL DELEGATION VIDEO WELCOME COMMENTS

U.S. Senator Sherrod Brown

U.S. Senator Rob Portman

STATE DELEGATION WELCOME COMMENTS

Ohio State Representative Adam Holmes

TEAM NEO REMARKS AND NASA DIRECTOR INTRODUCTION

Mr. William Koehler, CEO, Team NEO

8:45 - 9:05 AM

WELCOME AND NASA GLENN UPDATE

Dr. Marla Pérez-Davis, Director, NASA John H. Glenn Research Center

9:05 - 9:35 AM

EXPLORATION SYSTEMS DEVELOPMENT UPDATE

Dr. Kurt "Spuds" Vogel, Director of Space Architectures, Office of the Administrator, NASA

9:35 - 9:55 AM

NATIONAL SECURITY SPACE INTEL BRIEF

Col Maurizio "Mo" Calabrese, Commander, National Air and Space Intelligence Center

9:55 - 10:10 AM

OHIO'S INTEGRATED SPACE STRATEGY

Col (ret) Joesph E. Zeis, Senior Advisor for Aerospace and Defense, Office of Ohio Governor Mike DeWine

10:10 - 10:20 AM

BREAK

FOCUS AREA #1:

Preserve, Protect, Defend and Expand the Value of Federal Aerospace and Defense Installations

10:20 - 10:40 AM

NASA FIRESIDE CHAT

Gen (ret) John Thompson, United States Space Force

COL (ret) Doug Wheelock, Astronaut and Lunar Lander Joint Test Panel Lead, NASA

10:40 - 11:25 AM

MILITARY AND FEDERAL PERSPECTIVES PANEL

OHIO'S KEY ROLE IN NATIONAL SECURITY SPACE

Moderator: Mr. George Lecakes, VP and General Manager, National Security, Battelle

- Dr. Andrew 'AJ' Metcalf, Space Mission Area Lead, Air Force Research Lab (AFRL)
- Mr. Daniel S. Crouch, Deputy Director, Innovation and Prototyping Delta, U.S. Space Force
- Mr. John Gass, Director, National Space Intelligence Center (NSIC)

11:25 - 11:55 AM

NASA KEYNOTE

OHIO'S KEY ROLE IN THE NATION'S SPACE EXPLORATION GOALS

Col (ret) Pamela Melroy, Deputy Administrator, NASA

11:55 - 12:00 PM

VIDEO MESSAGE

Gen (ret) Lester L. Lyles, Former Commander, Air Force Materiel Command (AFMC)

12:00 - 1:00 PM

LUNCH BREAK

(In Research Support Building)

FOCUS AREA #2:

Research and Development: Increase the Research Portfolio and Statewide Synergies of Ohio's National Laboratories

1:00 - 1:05 PM

WELCOME BACK

(In Mission Integration Center Auditorium)

1:05 - 1:50 PM

RESEARCH AND DEVELOPMENT PANEL

Moderator: **Mr. Dennis Andersh**, CEO, Parallax

- **Dr. Eric W. Kaler**, President, Case Western Reserve University
- **Dr. Marcia Ballinger**, President, Lorain County Community College
- **Dr. Laura Bloomberg**, President, Cleveland State University
- **Mr. Charles Doarn**, Research Professor, Department of Environmental and Public Health Sciences, MPH Program Director, College of Medicine, University of Cincinnati; Special Assistant to the NASA Chief Health and Medical Officer

FOCUS AREA #3:

Preserve & Expand Ohio's Aerospace and Defense Industry;
Aggressively Attract Jobs and Companies to Ohio

1:50 - 2:10 PM

INDUSTRY BRIEF

OHIO'S CRITICAL SUPPLIER BASE AND CONTINUED IMPACT TO SPACE INDUSTRIALIZATION

Mr. Calvin Pennamon, Director, OPIR Exploitation Systems Operating Unit, Northrop Grumman

2:10 - 2:55 PM

SUPPLY CHAIN PANEL

Moderator: **Mr. Tim Sweeney**, Director, Advanced Manufacturing, Aerospace & Aviation, JobsOhio

- **Dr. Rebecca Owston**, Deputy Director of Research, BWXT Advanced Technologies LLC
- **Mr. Martyn Acreman**, Global Defense Market Director, Materion
- **Mr. Tom Margraf**, Vice President of Engineering and Operations, SpinTech
- **Mr. Mark Dapore**, Space Tech Director, L3 Harris

2:55 - 3:05 PM

BREAK

3:05 - 3:50 PM

OHIO'S ROLE IN COMMERCIAL LOW EARTH ORBIT SPACE STATIONS

Moderator: **Dr. John Horack**, Professor and Neil Armstrong Chair, Senior Associate Dean of Engineering, The Ohio State University

- **Mr. Jeffrey Manber**, President, International and Space Stations, Voyager Space
- **Dr. Carlos Grodsinsky**, Chief Operating Officer, ZIN Technologies
- **Mr. Richard Verbus**, Associate Director of Commercial LEO Destinations, Universities Space Research Association
- **Dr. Scott Shearer**, Chair of Food, Agricultural and Biological Engineering Department, The Ohio State University

FOCUS AREA #4:

Maintain and Grow the Workforce

3:50 - 4:20 PM

WORKFORCE PANEL

OHIO IS LEADING THE DEVELOPMENT OF OUR NATION'S FUTURE SPACE WORKFORCE

Moderator: **Ms. Kristina Clouse**, Senior Managing Director of Talent, JobsOhio

- **Mr. Richard Campos**, Senior Vice President, Business Development, Altamira Technologies Corporation
- **Mr. Darien J. Hammett**, Assistant Vice President, Customer Solutions Advocate, Radiance Technologies
- **Mr. Steven J. Dykeman**, Director of the Human Resources Office, NASA Glenn Research Center
- **Mr. Brian Fischer**, Vice President of Human Resources Business Operations, Intel Corporation

4:20 PM

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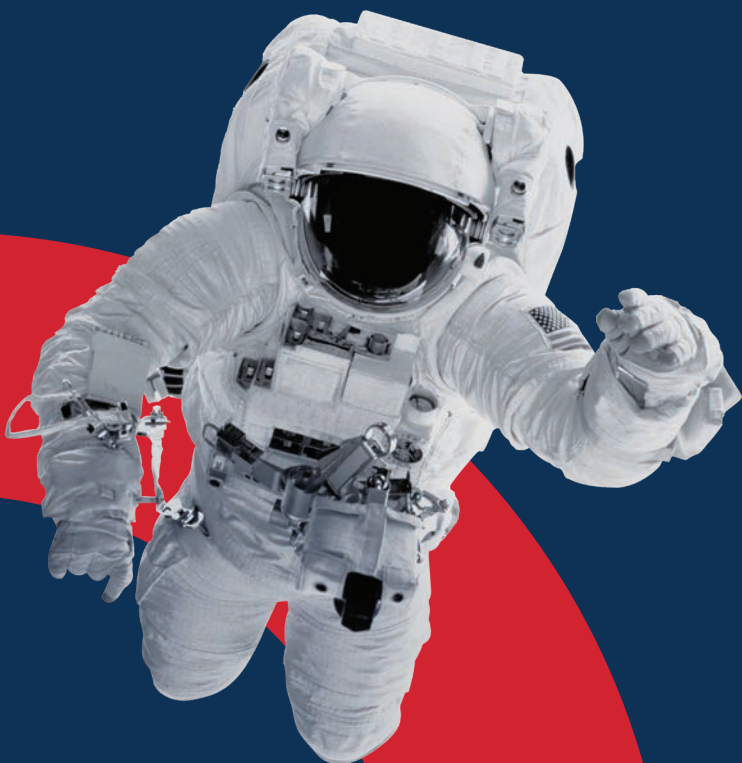


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SESSION BIOGRAPHIES



Mr. Martyn Acreman

Global Defense Market Director, Materion

Acreman is responsible for growing the Materion global defense business. Prior to joining Materion Beryllium & Composites in 2017, Mr. Acreman managed the largest beryllium fabricators in the US, General Dynamics Mission Systems Precision machining and reflective optics business, formerly Axsys Technologies (Speedring LLC). GDMS Precision machining has a 65-year history of fabricating complex geometry, ultra-precision structures and assemblies utilizing exotic materials and is known around the world for working with Beryllium and Beryllium containing alloys.

Prior to Axsys, Mr. Acreman was VP Operations for Electrolux compressor manufacturing. Previously, Mr. Acreman was Director of Advanced Manufacturing and Quality Assurance for Sachs Automotive. Earlier in his career he held positions as a manufacturing engineer, quality engineer & factory planning engineer for Lucas Girling.



Mr. Dennis Andersh

CEO, Parallax

With more than 20 years of documented leadership, management, and technical innovative successes, Mr. Andersh's expertise lies in basic research; laboratory research and development (R&D); system concept development; system and platform development; and the fielding of air, ground, and space mission-critical systems. He is highly respected for building collaborative partnerships of academia, industry, government, commercial, congressional, and local entities to create strategic growth across multiple new markets in the federal, state, and local government.

Before coming to Parallax, Mr. Andersh held several leadership positions at Science Applications International Corporation (SAIC). He led the Dayton region as Senior Vice President where he was responsible for SAIC's business with Wright-Patterson Air Force Base (WPAFB), Springfield Air National Guard, and the Dayton region.



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For more than 60 years, L3Harris has enabled challenging space missions — from early spacecraft, all the way to Mars. We deliver reliable technologies that often exceed mission life expectancy, including the Mars Odyssey which was launched 21 years ago.

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To learn more about our focused, agile solutions, visit us at [L3Harris.com/space](https://www.l3harris.com/space).

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Dr. Marcia Ballinger

President, Lorain County Community College

Marcia Ballinger, Ph. D., serves as Lorain County Community College's (LCCC) fifth president. She holds a Ph.D. in Community College Leadership from Walden University, an MBA from Kent State University, a BA in Journalism from Indiana University of Pennsylvania, and was an inaugural member of the Aspen Institute's Presidential Fellowship. In 2018, LCCC became the first community college in Ohio to offer an applied bachelor's degree in Micro Electromechanical Systems, and a second applied bachelor's degree in Smart Industrial Automation and Technology in 2021. LCCC has garnered national honors for excellence in student success awarded by the American Association of Community Colleges as "First in the Nation for Excellence in Student Success" in 2018 and by Achieving the Dream as the Leah Meyer Austin Award recipient in 2020.



Mayor Justin Bibb

Mayor of Cleveland

Justin M. Bibb is the 58th Mayor of Cleveland working to improve public safety, invest in neighborhoods and modernize City Hall. On January 3, 2022, Mayor Bibb took the oath of office as the city's first millennial mayor.

Mayor Bibb was born and raised on Cleveland's southeast side in the Mt. Pleasant neighborhood. Over the past 15 years, Mayor Bibb has worked in government, business and the nonprofit sector as an executive and nonprofit leader. He started his career in public service working for President Obama when he was in the U.S. Senate and later at Cuyahoga County as a Special Assistant advising on education and economic development policies. He led the Global Cities Practice at global research firm Gallup, served as Vice President at KeyBank and most recently as Chief Strategy Officer at Urbanova, a startup focused on improving cities.



Dr. Laura Bloomberg

President, Cleveland State University

Dr. Laura Bloomberg was appointed president of Cleveland State University (CSU) on April 26, 2022. She previously served as provost and senior vice president for academic affairs at CSU since September 2021.

Before Cleveland State, Bloomberg served eight years as dean and [prior] associate dean of the Humphrey School of Public Affairs at the University of Minnesota. In that capacity, Bloomberg led the global expansion of the school, established a national pathway program for college students underrepresented in public policymaking, launched an internationally focused Human Rights degree, and developed the Mandela Washington Fellowship program to support young leaders from countries across Africa. She successfully led the Humphrey School's \$20 million Leading Together fundraising campaign.



Senator Sherrod Brown

Member of the United States Senate

A lifelong Ohioan, Senator Sherrod Brown has spent his career fighting for the Dignity of Work – the idea that hard work should pay off for everyone, no matter who you are, where you live, or what kind of work you do.

He has held nearly 500 roundtables across Ohio, because he believes the best ideas don't come out of Washington – they come from conversations with Ohioans. Senator Brown serves as Chairman of the Senate Banking, Housing and Urban Affairs Committee. He also serves on the Finance Committee, the Agriculture Committee, and is the longest serving Ohioan on the Veterans' Affairs Committee.



Ms. Elaine Bryant

*Executive Vice President of Aerospace & Defense, DDC
Managing Director, JobsOhio*

Elaine Bryant is the Dayton Development Coalition's Executive Vice President for Aerospace and Defense. She is also the Managing Director of the Federal and Military sector for JobsOhio. In her current role, Elaine's focus is preserving, protecting and expanding missions at federal and military installations in the Dayton region and across the state of Ohio.

Elaine has over two decades of experience in the U.S. Air Force. She holds a B.S. in Engineering from The Air Force Academy and a master's in Aerospace from the University of Maryland.

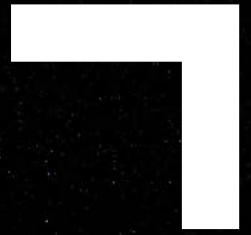


Colonel Maurizio "Mo" Calabrese

Commander, National Air and Space Intelligence Center (NASIC)

Col Mo Calabrese is the Commander, National Air and Space Intelligence Center, Wright-Patterson Air Force Base, Ohio. NASIC is the Air Force analysis center for foreign air, space and specialized intelligence. He is responsible for operating the \$2.1 billion center with its four groups, four directorates and 18 squadrons. Managing an annual budget of more than \$507 million, he leads nearly 4,100 personnel providing integrated, tailored assessments, products and services to joint operational forces, national policymakers and the acquisition community.

Colonel Calabrese has commanded ISR operations at the squadron and group levels supporting U.S. European Command, U.S. Africa Command, U.S. Central Command, U.S. Space Command, U.S. Pacific Command, and U.S. Southern Command with deployments to the Middle East.



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We're Ready for America's Next Giant Leap



Mr. Richard Campos
*Senior Vice President,
Business Development,
Altamira Technologies
Corporation*

Prior to joining Altamira, Richard spent 19 years at Raytheon. He was the Program Director for a National Cyber Program under Raytheon Intelligence and Space. Prior, he was part of the Program Management Excellence conducting analysis of systemic and individual program performance. He also served as Director and Portfolio Manager for Infrastructure and Platform Services under Solutions (GIS) from 2011-2018 where he managed and directed the strategy, execution and resources for the Infrastructure Development Programs, Procurement Programs and Common Application Services.



Ms. Kristina Clouse
Senior Managing Director, Talent

Kristi serves as the Senior Managing Director, Talent for JobsOhio. She oversees JobsOhio's commitment to a unique incentive tailored to their clients and investments to help strengthen Ohio's talent pipeline, both with the goal to prepare for the future of work.

Kristi and the team work collaboratively with state, regional and local partners within the workforce ecosystem to identify, define and refine short- and long-term talent strategies to address in-demand skill shortages in JobsOhio's sectors and work collaboratively on implementation.

Kristi has served JobsOhio since its inception in 2011 as Executive Director of Operations and Director of Project Management.



Mr. Daniel Crouch

Deputy Director, Innovation and Prototyping Delta, U.S. Space Force

Mr. Daniel “Dan” Crouch serves as the Deputy Director, Innovation and Prototyping Delta, Space Systems Command at Kirtland AFB, New Mexico.

Mr. Crouch Organizes, Trains and Equips a combined team of 650+ military, government civilians, and contractors at four geographically separated units and manages a \$1.05 billion portfolio to rapidly transition and deliver warfighting space concepts, technologies, and capabilities to the United States Space Force and mission partners across the National Security Space community. The Delta conducts test and experimentation, prototyping, demonstrations, and operations of innovative space systems and technology for the Space Systems Center. The Directorate also executes the Space Test Program on behalf of the Department of Defense.



Mr. Mark Dapore

Space Tech Director, L3Harris

Mark Dapore is Engineering Fellow and Chief Technologist at L3Harris. He is responsible for the technology planning and new product development for Space products at Space and Sensor’s division of L3Harris. In his customer-facing responsibilities, he builds technology roadmaps and secures funding to meet

future space market needs.

Mr. Dapore previously served as General Manager of Space Avionics division, responsible for financial performance and strategic focus in Space products. The Space group designs and manufactures launch vehicle control avionics, command receivers, transponders, telemetry transmitters, payload transmitters and data acquisition units flying on the earth orbit satellites, deep space satellites, and launch vehicles. L3Harris is also extending its infrared sensor business into space to include earth imaging, missile detect and space situational awareness.

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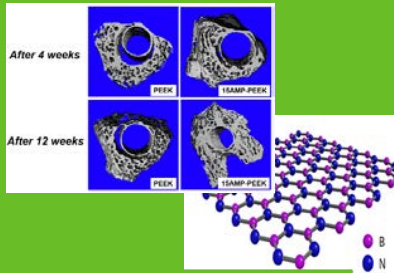
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Governor Mike DeWine

Governor of Ohio

Mike DeWine's story is a true Ohio story. Raised in Yellow Springs, Ohio, Mike DeWine and Fran (Struewing) met in the first grade and married while students at Miami University. They've been blessed with eight children and 26 grandchildren. Family is at the core of everything Mike DeWine does, and that's why he has devoted his life to fighting for Ohio's families. He knows when families are strong, Ohio communities are stronger, and our future is bright.

In 2018, Mike DeWine was elected to serve as the 70th Governor of the State of Ohio. The Governor has had a long and distinguished career in public service, focusing on protecting Ohio children and families. He was previously the 50th Attorney General of Ohio and has previously been elected to serve as Greene County Prosecutor, Ohio State Senator, U.S. Congressman, Ohio Lt. Governor, and U.S. Senator.



Mr. Charles Doarn

Research Professor, Department of Environmental and Public Health Sciences, MPH Program Director, College of Medicine, University of Cincinnati, Special Assistant to the NASA Chief Health and Medical Officer

Charles Doarn serves as the inaugural director of the University of Cincinnati (UC) Space Research Institute for Discovery and Exploration. In addition, he is a Research Professor, MPH Program Director and Division Director, Public Health Sciences, Department of Environmental and Public Health Sciences, UC College of Medicine. He also holds academic appointments at Political Science at UC, Aerospace Medicine at Wright State University, and Emergency Medicine at George Washington University. He currently provides subject matter expertise in aerospace medicine to NASA's Chief Health and Medical Officer.

He received his undergraduate degree in Biological Sciences (Microbiology) from The Ohio State University in 1980 and an MBA from the University of Dayton in 1988. Additional training includes the National Transportation Safety Board (NTSB) Aircraft Mishap Investigation Course, Ashburn, VA; and Advanced Program Management at NASA's Wallops Flight Facility, VA.



Mr. Steven J. Dykeman
Director of the Human Resources Office, NASA Glenn Research Center

Steven J. Dykeman is director of the Human Resources Office at the National Aeronautics and Space Administration's John H. Glenn Research Center in Cleveland and Langley Research Center located in Hampton, Virginia. Dykeman leads workforce planning, hiring and staffing strategies, employee performance management, career and leadership development, organizational design, and federal labor-management relations.

Prior to joining NASA, Dykeman served as chief of Human Resources Operations Enterprise at the U.S. Citizenship and Immigration Services, Office of Human Capital and Training from 2015 to 2020.



Mr. Brian Fischer
Vice President of Business Human Resources – Operations, Intel Corporation

Brian E. Fischer is the Vice President of Business Human Resources – Operations at Intel Corporation. He is responsible for Global Manufacturing, Supply Chain & Expansions, Technology Development, Non-Volatile Memory, Employee & Labor Relations and all International Regions (LAR, EMEA, APAC): setting the strategic HR direction, building, and growing a world class HR team with deep domain expertise and linking HR to business needs to ensure we “win” in the market. These teams represent over 100,000 employees of Intel's 121,000+ employee base and an HR team of over 250.

Previously, Brian was the VP of Human Resources for the Greater Asia Region (GAR) & the NAND Products & Solutions Group at Intel.

Greene County Career Center



Mr. John Gass
*Director, National Space
Intelligence Center
(NSIC)*

Mr. John L. Gass is the Director of the National Space Intelligence Center (NSIC) Planning Element and will serve as the Deputy Director of NSIC, Wright-Patterson AFB, Ohio, when it is established. Mr. Gass is responsible for all aspects of establishing the first Service Intelligence Center since 1987. NSIC will be responsible for providing foreign space threat foundational intelligence to the USSF, sister services, Combatant Commands, National decision makers, and allies and partners in space.

Mr. Gass is a native of Washington Court House, Ohio, graduated from the Ohio State University and began his career in 1987 with the Foreign Technology Division, renamed NASIC in 2004. He has spent the bulk of his 35-year career as a self-proclaimed space cadet with multiple space assignments to OSD and ODNI when he was not at NASIC.



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Dr. Carlos Grodsinsky
Chief Operating Officer, ZIN Technologies

Dr. Grodsinsky has over 3 decades experience in the Aerospace and Defense Industry. For the last 22 years, Dr. Grodsinsky has led ZIN providing design, development, integration, and operations for NASA's Physical and Life Science programs on the ISS for NASA Glenn Research Center (GRC) missions and technology development efforts. This work is done at ZIN's headquarters minutes away from NASA GRC through competitively awarded contracts for engineering and space flight hardware development and operations.



Mr. Darien J. Hammett

Assistant Vice President, Customer Solutions Advocate, Radiance Technologies

Darien J. Hammett joined Radiance Technologies in September 2019 and provides direct support to the Chief Executive Officer (CEO) and Chief Strategy Officer on developing, communicating, and realizing strategy. As part of the CEO's Strategy Team, he provides insight to, and develops strategy for, expanding markets where Radiance competes. He also serves as Radiance's Space Business lead. Before coming to Radiance, Darien spent more than 24 years in our Air Force and retired as a Colonel. He served as a Program Director twice (F-22 and RQ-4) and in a variety of engineering, program management, staff, and leadership positions across the Air Force, Office of Secretary of Defense, and National Reconnaissance Office (NRO).



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The logo for Radiance Technologies features a large, stylized letter 'R' on the left. To its right, the word 'RADIANCE' is written in a bold, italicized, sans-serif font. Below 'RADIANCE', the word 'TECHNOLOGIES' is written in a smaller, bold, italicized, sans-serif font. The entire logo is set against a dark background with a starry space pattern.

**THE FUTURE
OF SPACE
HAS ARRIVED.**

The background of the lower half of the page is a photograph of the Earth as seen from space. The planet's blue and white clouds are visible against the blackness of space, which is filled with numerous small white stars. A bright light source, likely the sun, is positioned just above the horizon of the Earth, creating a lens flare effect and illuminating the top of the planet.

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State Representative Adam Holmes

Member of the Ohio House of Representatives

State Representative Adam Holmes is serving his first full term in the Ohio House of Representatives after being appointed in 2019. He represents the 97th House District, which includes Guernsey County and portions of Muskingum County.

Holmes is the CEO of Frueh Enterprises, a mechanical and industrial contracting company in Zanesville. Prior to his business career, Holmes served over 27 years in the United States Marine Corps, retiring as Colonel.

Holmes is Chairman of the Ohio Aerospace and Aviation Technology Committee and Vice Chair of the House Health Committee. Holmes has focused on building trust and transparency in Ohio government, increasing health care access and affordability, supporting small businesses, and strengthening Ohio families.



Dr. John Horack

Professor and Neil Armstrong Chair, Senior Associate Dean of Engineering, The Ohio State University

Dr. John M. Horack is the Neil Armstrong Chair in Aerospace Policy, and holds a joint appointment between the Department of Mechanical and Aerospace Engineering in the College of Engineering, and the John Glenn College of Public Affairs.

Before coming to Ohio State in 2016, Horack served as the vice president for space systems at Teledyne Brown Engineering, as the vice president for research at the University of Alabama in Huntsville, and spent nearly two decades as a NASA civil servant, performing original theoretical and experimental research in high-energy astrophysics, cosmology and gamma-ray bursts, as well as serving as a member of the Senior Executive Service, leading the Science and Mission Systems Office at NASA's Marshall Space Flight Center.



Dr. Eric W. Kaler

President, Case Western Reserve University

Eric W. Kaler is president of Case Western Reserve University. He joined Case Western Reserve in July 2021 from the University of Minnesota, where he served as university president for eight years.

An accomplished chemical engineer and visionary university leader, Kaler's career in higher education spans more than 40 years. Kaler holds 10 patents, has published more than 200 peer-reviewed papers, and is a member of the National Academy of Engineering. He is a fellow of the American Academy of Arts and Sciences and a member of the inaugural class of the National Academy of Inventors.



Mr. William Koehler
Chief Executive Officer, Team NEO

As Chief Executive Officer of Team NEO, Bill Koehler is focused on seeing the Northeast Ohio Region grow and thrive. With more than 20 years of banking experience behind him, Bill puts his knowledge and expertise to work as he collaborates with partners and others to attract new businesses and accelerate the impact of innovation in the region.

Bill's voice in the economic development community helps align the services of Team NEO with the needs of the region. Under his leadership, Team NEO is enhancing Northeast Ohio's economic vibrancy through four strategies focused on supply chain resilience, talent development, site preparedness and promotion of the region.



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Lieutenant Colonel John Kelch
Commander, 126th Intelligence Squadron

Lieutenant Colonel John K. Kelch is the Commander, 126th Intelligence Squadron, 178th Wing, Springfield Air National Guard Base, Ohio. Lt Col Kelch is responsible for all aspects of the squadron to include leadership, management, and the daily execution of operations, training, and mission accomplishment.

Lt Col Kelch also ensures the readiness and operational warfighting capability for 70 members in the squadron.

Lt Col Kelch joined the United States Air Force in 1995 as an Airman Basic, was trained as an Aircraft Armament Systems Specialist and was permanently stationed in South Carolina, South Korea, and Idaho. After completion of his initial 4 year commitment, he joined the 178th Fighter Wing, Ohio Air National Guard. Lt Col Kelch commissioned as a 2nd Lieutenant from the Academy of Military Science in 2006.



Mr. George Lecakes
Senior Vice President and General Manager, National Security, Battelle

George Lecakes current role of three years is the Senior Vice President and General Manager of Battelle's National Security business unit. In this role he oversees staff divided out between Battelle's Advanced Mission Solutions (AMS); CBRNE; Cyber and the Logistics, Operations and Ground Systems business lines

as well as the Maritime subsidiaries.

Since joining Battelle in 2004, George has held the following other positions; a General Manager for the Chemical Demilitarization business for 3 years, a Product Line Leader for 3 years, a Senior Site Manager and Chief Scientist for 4.5 years, and lastly, a Senior Research Scientist for 3 years.



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**General Lester Lyles, USAF
(Ret)**

Former Commander, Air Force Materiel Command (AFMC)

After retiring from the Air Force as the Commander of Air Force Materiel Command at WPAFB, General Lyles was named by President George W. Bush as a member of the President's Space Commission in 2004. He also served on the Augustine Space Commission Space Committee in 2009 developing the agenda for the Human Space Flight missions of NASA. He chaired the National Research Council's 'Roles and Rationale Study of the U.S. Civil Space Programs in 2009.

General Lyles was appointed to the Defense Science Board from 2009 to 2016, and, appointed by the White House to the President's Intelligence Advisory Board from December 2009 to May 2013. General Lyles was named the Astronautics Engineer of the Year by the National Space Club in 1999.



Mr. Jeffrey Manber
*President International
and Space Stations,
Voyager Space*

Jeffrey Manber is the Co-Founder and first employee of Nanoracks.

He served as the CEO from 2009 until 2021 where he broke barriers for access to space, oversaw the growth of numerous commercial International Space Station programs, and oversaw the development of the first and only commercial Airlock on the space station. Most recently he has been appointed as President of International at Voyager Space.



Mr. Tom Margraf

Vice President of Engineering and Operations, SpinTech

Mr. Margraf has a BS in mechanical engineering from the University of Dayton and started his career in contract R&D services with Cornerstone Research Group, CRG. During his time in contract R&D he led the development of two product lines using smart materials, self-healing composite solutions and shape memory polymer tooling. Mr. Margraf went out to be a co-founder of a spinout company, Spintech Holdings Inc in 2010 and now serves as the President of Spintech.

Mr. Margraf has led engineering and deployment of more than three dozen flight qualified manufacturing solutions for defense aerospace, commercial aerospace, and space-based platforms using advanced materials and novel methods of manufacture.



Col (ret) Pamela Melroy

Deputy Administrator, NASA

Col. (USAF, ret) Pam Melroy was sworn in as the NASA Deputy Administrator on June 21, 2021.

As Deputy Administrator, Melroy performs the duties and exercises the powers delegated by the Administrator, assists the Administrator in making final agency decisions, and acts for the Administrator in his absence by performing all necessary functions to govern NASA operations. Melroy is also responsible for laying the agency's vision and representing NASA to the Executive Office of the President, Congress, heads of federal and other appropriate government agencies, international organizations, and external organizations and communities.

Melroy was selected as an astronaut candidate by NASA in December 1994. One of only two women to command a space shuttle, Melroy logged more than 38 days (924 hours) in space.

Melroy holds a bachelor's degree in physics and astronomy from Wellesley College and a master's degree in Earth and Planetary Sciences from the Massachusetts Institute of Technology.



Dr. Andrew Metcalf

Space Mission Area Lead, Air Force Research Laboratory

Dr. Andrew 'AJ' Metcalf is the Space Mission Area Lead, Air Force Research Laboratory. He coordinates AFRL's space science and technology investment strategy, ensuring synchronization with the tech needs for USSF, Space Operations Command, and Space Systems Command. He leads engagements with partners throughout the Department of Defense, the Intelligence Community, industry, and academia. Dr. Metcalf has published over 70 papers in national and international journals or conferences. He is an active journal referee and serves as a subject matter expert to other DoD agencies and organizations regarding photonic technologies.



Dr. Rebecca Owston

Deputy Director of Research, BWXT Advanced Technologies LLC

Dr. Rebecca Owston is the deputy director of research for BWXT Advanced Technologies LLC, a subsidiary of BWX Technologies, Inc. (BWXT). In her role, she drives business innovation, developing new applications of multi-phase flow modeling/testing, expanding additive manufacturing techniques for nuclear components and advanced reactor design, and generating data science concepts for factory-of-the-future manufacturing.

Before joining BWXT, Dr. Owston served as a researcher and project manager for a wide range of numerical simulation and experimental projects at Southwest Research Institute. She has successfully written proposals and conducted large-scale research projects for both government and commercial clients.



Mr. Calvin Pennamon

*Director, OPIR Exploitation Systems Operating Unit,
Northrop Grumman Space Systems*

Calvin Pennamon is the director of the Overhead Persistent Infrared (OPIR) Exploitation Systems Operating Unit (OESOU) for the Payload and Ground Systems division, Space Systems sector, Northrop Grumman's premier provider of space and launch systems serving national security, civil and commercial customers.

In this role, he directs the OPIR and data exploitation portfolio for ground operations in Boulder, CO within the Department of Defense and civilian government agencies. Previously, he managed the company's mission payload engineering team for the Space-Based Infrared System (SBIRS) constellation.



Dr. Marla Pérez-Davis

Director, NASA John H. Glenn Research Center

Dr. Marla E. Pérez-Davis is director of NASA's Glenn Research Center in Cleveland. She leads a staff of more than 3,200 civil servants and support service contractors and manages an annual budget of over \$800 million.

Prior to becoming center director, Dr. Pérez-Davis held several leadership positions at Glenn including deputy center director, Aeronautics Research Office director, Project Liaison and Integration Office chief, and Electrochemistry Branch chief.



Senator Rob Portman

Member of the United States Senate

Rob Portman is a United States Senator from the state of Ohio, a position he has held since he was first elected in 2010. Portman previously served as a U.S. Representative, the 14th United States Trade Representative, and the 35th Director of the Office of Management and Budget (OMB). In 1993, Portman won a special election to represent Ohio's 2nd congressional district in the U.S. House of Representatives and served six terms before President George W. Bush appointed him as U.S. Trade Representative in May 2005.

Portman currently serves as the Ranking Member on the Senate Homeland Security and Governmental Affairs Committee, as well as on the Senate Finance and Foreign Relations Committees. He was born and raised in Cincinnati, where he still lives today with his wife Jane. Together they have three children: Jed, Will, and Sally.

ZIN Technologies

ZIN Technologies, Inc. is an experienced developer of ground and Space Flight systems for manned and unmanned applications. For six decades, we have provided integrated hardware and software systems and engineering services to NASA, DoD and Fortune 500 companies.

ZIN began developing scientific payloads for sounding rockets, balloons, shuttle, MIR and International Space Station (ISS) applications, and later evolved into the development of systems that support new space platforms. On ISS we currently support research through ZIN designed, developed and operated facilities for Artemis Astronaut Safety to ensure future spacecraft fire detection and extinguishment. We are building next generation power systems for the Sierra Space Dream Chaser winged spacecraft. We are currently developing future Commercial LEO destination laboratory systems that will host biological and physical research, science, and manufacturing on private space stations. ZIN leverages our experience on the ISS in support of the Lunar Habitation Logistics Outpost providing structural health monitoring and smoke detection systems. ZIN supports NASA's Launch Services Program (LSP) providing end-to-end launch services for NASA and NASA-sponsored payloads on commercial expendable launch vehicles. ZIN provides expertise for In-space power and Electric Propulsion (Ion and Hall Thruster based) and IMU satellite systems used for formation flight and proximity operations, including orbital maintenance and station keeping and transfer at the end of the life. ZIN specializes in full life cycle progression between concept, detailed design, engineering, manufacturing, and operations. ZIN is a proud partner of NASA GRC since 1969.



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Mr. Baiju Shah

President and CEO, Greater Cleveland Partnership

Baiju R. Shah is the President & CEO of Greater Cleveland Partnership, the region's leading economic development organization and the nation's largest metropolitan chamber of commerce. Guided by a board of CEOs, GCP focuses on accelerating growth and prosperity through strategic initiatives, business services, real estate development. Previously, Shah was CEO of BioMotiv, CEO of BioEnterprise, and a Senior Fellow of the Cleveland Foundation. He also served on the Boards of Invacare and Athersys, and as a Senior Advisor of Faster Cures. Shah began his career at McKinsey.

Mr. Shah serves on numerous civic boards and is recognized as one of Cleveland's most influential leaders. He received a JD

from Harvard Law School and a BA from Yale University.



Dr. Scott Shearer

Chair of Food, Agricultural, and Biological Engineering Department (FABE), The Ohio State University

Scott Shearer serves as Professor and Chair of Food, Agricultural and Biological Engineering at OSU. Highlights of his research career include development of methodologies and controls for metering and spatial applying crop production inputs, modeling of agricultural field machinery systems, autonomous multi-vehicle field production systems and strategies for deployment of UAVs in agriculture.

He has lead research supported by over \$15M in grants, authored more than 200 technical publication, and has made numerous invited presentations at international conferences, professional meetings and farmer forums. Dr. Shearer is a Fellow of the American Society of Agricultural and Biological Engineers.



Mr. Terrance Slaybaugh

Vice President, Sites and Infrastructure, JobsOhio

Terrence (Terry) Slaybaugh is the vice president of sites and infrastructure for JobsOhio. Terry's team manages JobsOhio's six partner contracts, the sites programs, and the business and community inclusion programs. In addition to these programs, Terry manages JobsOhio's Air Service Restoration Program and is in contract with airport sponsors and state and federal officials on airport, commercial air service and air cargo issues.

Before joining JobsOhio, Terry was the director of aviation for the city of Dayton where he led economic development efforts at the airport.




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**Lieutenant General
John F. Thompson, USAF (Ret)**

John F. "JT" Thompson is a recently retired U.S. Air Force Lieutenant General and former Commander of the U.S. Space Force's Space and Missile Systems Center at Los Angeles Air Force Base, California; where he was responsible for approximately 6,000 employees nationwide and an annual budget of \$9 billion. As the Department of the Air Force Program Executive Officer for Space, General Thompson managed the research, design, development, acquisition and sustainment of satellites and the associated command and control systems.

Dr. Kurt "Spuds" Vogel

Director of Space Architectures, Office of the Administrator, NASA

Dr. Kurt "Spuds" Vogel is the Director of Space Architectures in the Office of the Administrator at NASA Headquarters in Washington DC. He was appointed to the position and sworn in by Deputy NASA Administrator Pam Melroy on 19 July 2021.

Dr. Vogel comes to NASA with over 32 years of U.S. government service, primarily in the Defense Department, as a technical leader, senior program manager, and chief technologist.

Prior to his NASA appointment, Dr. Vogel served 6 years at the Defense Advanced Research Projects Agency (DARPA) leading innovative research in stealth technology, electronic warfare, air-space integration, and space control systems. He managed a portfolio of classified, state-of-the-art, high-risk programs that spanned multiple DARPA offices, including both the Tactical Technology Office (TTO) and the Strategic Technology Office (STO).



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Colonel Douglas Wheelock, US Army (Ret)

Astronaut and Lunar Lander Joint Test Panel Lead

Douglas H. Wheelock was selected by NASA in 1998 as an astronaut. The retired Colonel has accumulated more than 178 days in space. Wheelock flew on STS-120 in 2007, and in 2010, he served as a Flight Engineer for Expedition 24 and commander for Expedition 25. During this mission, Wheelock conducted three unplanned spacewalks to replace a faulty ammonia pump module.

The New York native holds a Bachelor of Science in Applied Science and Engineering from the United States Military Academy in West Point, New York and a Master of Science in Aerospace Engineering from Georgia Tech in Atlanta, Georgia.



Colonel Joseph Zeis, USAF (Ret)

Senior Advisor for Aerospace and Defense, Office of Ohio Governor Mike DeWine

Colonel Joseph E. Zeis Jr. serves as Senior Advisor for Aerospace and Defense, a cabinet-level position Governor DeWine created to focus on Ohio's military and aerospace installations.

Zeis is a retired U.S. Air Force Colonel, with over 26 years of service. He graduated from the U.S.

Air Force Academy in 1981, and he holds Master's Degrees in Aeronautical Engineering from the Air Force Institute of Technology and in National Resource Strategy from the Industrial College of the Armed Forces. He is a Master Navigator, a Distinguished Graduate of the U.S. Air Force Test Pilot School, and a certified Acquisition Program Manager who has presided over advanced technology contracts of major aircraft systems. In his last active duty position in the Air Force, he commanded the 46th Test Wing at Eglin Air Force Base in Florida.



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